WHAT IS CLAIMED IS:

I.	1. In a computer system having an operating system and one or more
2	devices, a method for testing a device, the method comprising:
3	determining a device driver for the device;
4	determining a class to which the device driver belongs; and
5	performing a diagnostic test based on the class of the device driver.
1	2. The method of claim 1 wherein the step of determining a device driver
2	occurs while the operating system is active.
1	3. The method of claim 1 further comprising coordinating access to the
2	device prior to the step of performing a diagnostic test.
1	4. A method for performing diagnostics on a computer hardware device
2	having a device driver for interfacing with the computer hardware device, the method
3	comprising:
4	publishing capabilities of the device driver;
5	receiving the capabilities of the device driver; and
6	performing a diagnostic test on the computer hardware device, based on the
7	capabilities of the device driver.
1	5. The method of claim 4 wherein the step of receiving capabilities of the
2	device driver further comprises identifying capabilities of the device driver by a diagnostic
3	module.
1	6. The method of claim 4 further comprising coordinating access to the
2	computer hardware device prior to the step of performing a diagnostic test.
1	7. The method of claim 5 wherein the step of performing a diagnostic test
2	further comprises testing the computer hardware device using the diagnostic module.
1	8. The method of claim 4 further comprising determining the device
2	driver is for interfacing with the computer hardware device.
1	9. The method of claim 4 wherein the step of publishing capabilities of
2	the device driver further comprises broadcasting that the device driver is capable of accessing

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- the computer hardware device in parallel with a diagnostic module after allocating an area of the computer hardware device for testing.
 - 10. The method of claim 4 wherein the step of publishing capabilities of the device driver further comprises broadcasting that the device driver is capable of accessing the computer hardware device in parallel with a diagnostic module if the device driver is notified by the diagnostic module when testing is complete.
 - 11. The method of claim 4 wherein the step of publishing capabilities of the device driver further comprises broadcasting that the device driver is capable of accessing the computer hardware device in parallel with a diagnostic module if the device driver is off-line.
 - 12. The method of claim 4 wherein the step of publishing capabilities of the device driver further comprises broadcasting that the device driver is capable of being passed through to access the computer hardware device.
 - 13. The method of claim 4 wherein the step of publishing capabilities of the device driver further comprises broadcasting that the device driver is capable of being passed through when in diagnostic mode to access the computer hardware device.
 - 14. The method of claim 4 wherein the step of publishing the capabilities of the device driver further comprises broadcasting that only diagnostics embedded in the device driver may perform diagnostics on the computer hardware device.
 - 15. The method of claim 1 further comprising allocating an area of the device for testing the device.
 - 16. The method of claim 15 wherein the step of performing a diagnostic test is done directly on the area allocated, and further comprises the step of releasing the area allocated when the test is concluded.
 - 17. In a computer system having an operating system and at least one hardware device, a diagnostic hardware access layer interface for performing diagnostics, the interface comprising:
- 4 a device driver belonging to a class of device drivers for managing the 5 hardware device;

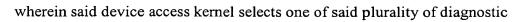
devices;

6	a kernel module for communicating with the device driver and the operating	
7	system; and	
8	a diagnostic module for coordinating with the kernel module and/or the devic	е
9	driver in order to perform diagnostics on the hardware device.	
1	18. The interface of claim 17 wherein the device driver is capable of	
2	publishing the class to which it belongs.	
1	19. The interface of claim 17 wherein the kernel module identifies the	
2	class of the device driver.	
1	20. The interface of claim 17 wherein the device driver is capable of	
2	accessing the hardware device in parallel with the diagnostic module.	
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	21. The interface of claim 17 wherein the kernel module is capable of	
2	determining whether diagnostics are performable on the hardware device.	
1	22. The interface of claim 17 wherein the class of the device driver is	
2	dependent on the hardware device.	
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1	23. The interface of claim 17 wherein the class of the device driver is	
2	dependent on the mode of the device driver.	
1	24. The interface of claim 17 wherein the class of the device driver is	
2	dependent on both the mode of the device and the hardware device.	
1	25. The method of claim 4 wherein the step of publishing the capability of	f
2	a device driver further comprises broadcasting that the device driver is capable of accessing	L
3	the computer hardware device in parallel with a diagnostic module	
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1	26. A system for testing one or more devices attachable to a computer	
2	system, comprising:	
3	a device access kernel, wherein said device access kernel is capable of	
4	identifying a device driver associated with a device and determining what class said device	
5	driver belongs to; and	

a plurality of diagnostic tests designed to respectively test said one or more

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9 tests for testing said device based on said determined class.